Remarks

In response to the Office Action mailed September 16, 2008 applicants request entry of the foregoing amendments, consideration of the following remarks and reconsideration of the rejections set forth in said office action.

The present invention is direct toward a composition based on trans-1,2-dichloroethylene and 1,1,1,3,3-pentafluoropropane which does not exhibit a flash point. The composition according to the present invention can be used as solvent or blowing agent. The composition according to the invention comprises from 95 to 98% by weight of trans-1,2-dichloroethylene and from 2 to 5% by weight of 1,1,1,3,3-pentafluoropropane. The present inventors discovered that while trans-1,2-dichloroethylene exhibits a flash point (as measured via ASTM Standard D 3828) of from about –4 to –11 degrees C, adding only 2 to 5 weight % of 1,1,1,3,3-pentafluoropropane to trans-1,2-dichloroethylene results in a composition which exhibits no flash point. It is surprising and unexpected that the addition of such a minor amount of 1,1,1,3,3-pentafluoropropane could render the trans-1,2-dichloroethylene "flash point free". The combination of the present invention also exhibits a boiling point higher than ambient temperature (22°C) which is an advantage for solvent use.

As shown by the examples of the present application, trans-1,2-dichloroethylene has a relatively low flash point of from –4 to –11 degrees C. Such a low flash point makes use as a solvent, typically at ambient or elevated temperatures hazardous due to the fire risk. It was discovered that the addition of very small amounts of 1,1,1,3,3-pentafluoropropane could eliminate the flash point entirely in the temperature ranges where the combination would be used as a solvent. In addition, the combination exhibits good solubilizing power. Applicants submit that such a large impact on flash point from adding such a small amount of 1,1,1,3,3-pentafluoropropane is surprising and not anticipated or rendered obvious by prior disclosures of combinations of trans-1,2-dichloroethylene and 1,1,1,3,3-pentafluoropropane at different ratios.

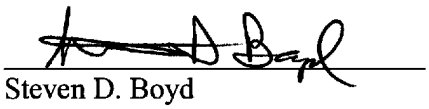
Claims 1-5 were rejected under 35 USC 102(b) as being unpatentable over Knopeck (US 2003/0234380). Applicants submit that Knopeck '380 fails to render obvious the invention as presently claimed.

Knopeck '380 discloses a composition of trans-1,2-dichloroethylene and 1,1,1,3,3-pentafluoropropane and teaches that such composition within a specified ratio range exhibits a relatively constant boiling point. Applicants submit that Knopeck '380 fails to disclose the "manufacture" or testing of a combination of trans-1,2-dichloroethylene and 1,1,1,3,3-pentafluoropropane within the range of ratios of the present invention. Further, applicants submit that Knopeck '380 fails to include any teaching related to the flash point of combinations of trans-1,2-dichloroethylene and 1,1,1,3,3-pentafluoropropane within the ratio range of the present invention. Applicants submit that Knopeck fails to disclose or render obvious the surprising, total mitigation of flash point provided by the addition of a minor amount of 1,1,1,3,3-pentafluoropropane to trans-1,2-dichloroethylene. The examples in the present application evidence the surprising and unexpected results provide by the presently claimed compositions, which are neither anticipated nor rendered obvious by the teaching of Knopeck '380. Applicants submit that in view of the foregoing comments and amendments to the claims, the rejection should be withdrawn.

Applicants submit that in view of the foregoing amendment and remarks, claims 1 and 4-5, are in condition for allowance and prompt favorable action is solicited.

Respectfully submitted,

Date: December 11, 2008



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